

## THREE CASES

OF

## LEAD PALSY FROM THE USE OF A COSMETIC

CALLED

## “LAIRD'S BLOOM OF YOUTH”

BY

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EXTRACTED FROM THE  
TRANSACTIONS OF THE AMERICAN MEDICAL ASSOCIATION.

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PHILADELPHIA:  
COLLINS, PRINTER, 705 JAYNE STREET.  
1869.



## THREE CASES OF LEAD PALSY FROM THE USE OF A COSMETIC CALLED "LAIRD'S BLOOM OF YOUTH."

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CASE 1.—On the 27th September, 1868, I was called to see Miss —, of Kansas, who had been sent to me from that State, by Dr. Logan, to be treated for disease of the spine, and paralysis of the forearms.

I found a very tall beautiful woman of about 19, of remarkably large frame, very erect, with both hands dropped at nearly a right angle at the wrists, and perfect inability to extend them. She could not extend the fingers in the least, or extend or abduct either thumb. The muscles were more atrophied, and the forearms and hands more wasted than any case I had at that time ever seen.

The largest circumference of the forearm just below the elbow was eight inches, circumference at wrist five inches. The interosseous spaces on the back of the hand were very distinct, and the adducens, and extensors of the thumbs, as well as all the muscles in the palms of the hands were so atrophied, that the contours of the first metacarpal bones on either side were almost as conspicuous as they would have been in a skeleton, with a tight glove drawn over it.

She was unable to feed herself, comb her hair, pick up a pin, hook or button her dress, or in fact make any movements whatever with her hands, except the *very slightest flexion* of her fingers. She had been in this condition for some months, and was gradually getting worse. She could flex and extend the forearms, and could elevate the arms almost to a right angle with the body; but was perfectly unable to extend the hands or fingers in the least. She could walk tolerably well, but was not very steady or elastic in her step, and easily became exhausted. Going up or down stairs was done with great difficulty, and I observed that, to sit down, or get up from a very low seat, required all the muscular exertion of which she was capable.

On removing her clothes to examine the spine, I found that she was sustained in the very erect position, which had attracted my

attention, by "Taylor's Spinal Supporter," a most valuable apparatus in cases where its use is indicated, and I naturally inferred that she must have been suffering from some disease of the spine. On removing the supporter, which weighed three pounds, her head and trunk immediately bent forward; and with her arms crossed on the chest, the hands dropped at the wrist, at almost an acute angle with the forearms, she presented an exact counterpart of the "Grecian Bend" photograph, which has been so common in the shop windows for the past year or more.

I examined her spinal column with the greatest possible care, by concussion, compression, extension, bending her forward, backward, laterally; and by rotating the spine upon the pelvis, so as to put every ligament upon extreme tension, and subject every cartilage and bone to firm pressure, without the slightest evidence of pain or inconvenience. I therefore concluded that if she had ever had Potts' disease of the spine, it was the most perfect cure that I had ever seen.

She gave the following history of herself: That in the summer of 1866 she had bilious intermittent fever for some weeks, which prostrated her very much, and after slight fatigue she had a relapse from which she recovered very slowly. That in September she took a ride on horseback, a distance of ten miles, and on her return the horse ran off, and carried her at great speed nearly a mile. She exerted all her strength to stop him, without effect, and was finally compelled to put him into a fence. She was very much exhausted, but did not dismount until she reached home, a distance of some two miles or more. A few days after this great exertion, she found "her hands were getting weak—first discovered it by accidentally dropping a skillet out of her hands at a candy pulling." She then noticed that a book would frequently drop out of her hands while reading, and that she could not strike the piano keys correctly, or with as much force as formerly, and that her arms and hands were getting much thinner.

She came to New York to consult me; but as I was absent from the city, she was recommended to Dr. C. F. Taylor, to try the Swedish Movement Cure. The Dr. diagnosed her case as Potts' disease, and applied a spinal supporter. She was very ill for some days at Dr. Taylor's establishment in Broadway, with what the Dr. states in his letter to Dr. Logan, of Leavenworth, was spinal osteitis. Dr. Thomas, who saw her at this time in consultation, informs me that he considered her case as one of hysteria.

She was sent home after a few weeks, with the spinal supporter applied, and which she has continued to wear until the present time, having been assured that her hands and arms would soon recover their use, after her back got well. I mention these facts, not in the way of censure; but simply to show the difficulty of diagnosis, and the danger of drawing wrong conclusions, without the most careful observation, for this very case was published in the *Quarterly Journal of Physiological Medicine*, April, 1868, pp. 282-3, as a case of carnomania.

Her back seemed to be supported by the brace, and she could walk with her body more erect; but her entire muscular system grew weaker, she could walk only a short distance without great fatigue, and her forearms and hands wasted so rapidly, that in a few months she completely lost the power of *extension*, and for the past year had been perfectly helpless, and had to be dressed and fed like a child.

As I could find no evidence of disease in the spinal column, or cord, and no organic lesion of the nervous centres, my diagnosis was that there was no "Potts' disease," but a case of "Lead Palsy." The usual blue margin of the gum was not conspicuous, but between each of the teeth the gum was more purple than natural.

I made most careful inquiry to ascertain the source of the lead, but was not successful. They had no lead pipes in the house to contaminate the water drank, but took it from a spring in wooden buckets, had used no lead in painting the house, had drank nothing from lead-pipes, or been exposed to its influence in any way that I could ascertain even after the most careful inquiry.

Prof. Wm. A. Hammond saw her in consultation on the following day, and without my giving him any hint or information, confirmed my diagnosis of lead palsy, although from the mother's description he expected to find a case of "Potts' disease," and examined her especially for it.

Not being able to ascertain, after the most careful inquiry, any source from which the lead could have been received into the system, he stated that it might possibly be a case of muscular atrophy from excessive use, and unless the muscles could be stimulated by the continuous current of galvanism, the prognosis was very unfavorable.

The exertion of stopping the runaway horse seemed to justify this opinion. I applied a powerful Battery of Kidder's, without producing any muscular contraction.

As there was rather profuse menstruation, attended with great pain, and intense vaginismus; and as Dr. Thomas had informed me that there was an hysterical element in the case when he had seen her two years before, I called Dr. Marion Sims in consultation Sept. 27th, 1868.

The pain of examination was so intense that, having no chloroform at hand, we had to postpone it.

Sept. 28. Dr. Sims and Dr. Neftel saw her with me, and I had to carry the chloroform to profound stupor, with stertorous respiration, before Dr. Sims could make any examination of the vagina. No serious disease was discovered save this intense vaginismus. Dr. Neftel stated that he had seen three cases of "lead palsy" in which vaginismus had been a prominent symptom. Is it a symptom of the disease in females?

On again examining her for the source of the lead, she asked me "if it could possibly come from the whiting." On asking her what that was, she informed me that it was the *Bloom of Youth*, used for the complexion, and manufactured by Laird, 74 Fulton St., N. Y. She had used nearly a bottle a month for about two years and a half; but for the last eight or nine months had been compelled to have the application made by an assistant, as she was unable to apply it herself.

She gave me the remnants of a bottle of the "Bloom of Youth," which, upon analysis by Prof. R. O. Doremus, was found to be highly impregnated with acetate and carbonate of lead.

I immediately put her on large doses of iodide of potassium, commencing with twenty grains a day, and increased it up to ninety. Collecting the secretion of urine for the following three days, I also sent it to the Dr. for examination, and received the following reply:—

NEW YORK, October 8th, 1868.

MY DEAR DOCTOR: The sample of urine you sent me yields a small quantity of lead.

Yours cordially,  
R. OGDEN DOREMUS.

PROF. SAYRE.

After she had been under the use of the iodide of potassium for about one week, the Kidder's battery, at the same strength as at first applied without effect, now produced quite vigorous contractions.

Its use was now continued every other day, for about thirty or forty minutes at a time, with most marked improvement.

Believing that the natural position of the fingers was important to sustain the circulation, and that voluntary exercise was necessary to increase the nutrition and development of the muscles, I got Dr. Hudson, the manufacturer of artificial limbs, to construct for her a very light extension apparatus for the hands and fingers, which answered the purpose most admirably.

Dr. Hudson has made another set of these instruments for me in another case, which are so great an improvement upon the first that I will refer to them in the description of the case in which they were applied.

With the instruments properly adjusted she could play upon the piano remarkably well, and I think that this use of her hands materially aided in expediting her recovery, which is now almost perfectly complete.

I received a letter from her dated Nov. 25th, 1868, written in a most beautiful hand, and in which she states, "My hands have improved wonderfully, and beyond all expectation. . . . My left hand, which you will remember, I could only raise for a second, and then with great difficulty, I can now use *better* than I could my right hand when you saw me two weeks ago. My right hand has improved so rapidly that I can extend the fingers almost perfectly straight. . . . I have gained over twenty pounds, and my arms measure at the wrist six and a quarter inches, and just below the elbow nine and a half. And I feel better in every particular than I have for more than two years."

CASE II.—Mrs. ——, residing on the Hudson River, came to me, Nov. 1868, suffering from complete paralysis of the extensor muscles of both hands, and of all the fingers, caused by the use of "Laird's Bloom of Youth." The arms were cold, the interosseous muscles were wasted, as well as all those upon the posterior aspect of the forearms.

The paralyzed muscles gave no response to a current from a strong Kidder's battery. The arms measured above the wrists five inches, below the elbows seven and a half inches.

Three years ago she commenced using "Laird's Bloom of Youth," for the complexion. After a year she began to suffer from nausea, pain in the back, colic-like pains, frequent headaches, with general debility. Shortly after this she began to observe *weariness* in the

extensor muscles of the wrists and forearms, both hands having a tendency to drop.

Drs. Clark and Thomas, of this city, saw her in consultation with her regular attending physician, Dr. Hasbrouck; by them the case was considered (as the patient states) as one of "paralysis and nervous debility, with dyspepsia."

She continued to use the cosmetic at the rate of about a bottle a month.

The paralysis of the extensors increased continuously, until for the last six months she has become perfectly helpless as regards the power of extension of the hands or fingers. She has to be fed and dressed by her maid; in fact, has no more use of the hands than if they were dead.

She walks with an inelastic step, stumbles on going up and down stairs, and becomes easily exhausted upon any muscular exertion. In this case there was slight blueness on the margin of the gums.

I gave her 90 grs. of iodide of potassium every day, with dilute sulphuric acid, and ordered a "Turkish bath" twice a week. At the end of one week the battery applied with the same power produced manifest contractions. This was applied every other day for twenty or thirty minutes, friction and shampooing of the muscles, with passive movements every day. And in three months she had so far recovered as to dress herself—even to the putting on of a well-fitting glove, and also buttoning it. At the end of five months she had entirely recovered, and gained twenty-eight pounds in weight.

CASE III.—Miss —, of Maryland, aged 21, came to me in April 1869, with complete loss of power of all of the extensor muscles of both forearms. The hands were wasted to a skeleton, and the interosseous spaces on the back of the forearm of either side were so conspicuous and deep that when her forearms were prone and flexed at a right angle with the arms, water would remain in them like a trough. (See Fig. 1.)

She stated that five years before, in 1864, she was exposed to intense cold, very thinly clad, that both of her arms were nearly frozen, and looked almost transparent. This exposure was followed by a rheumatic fever, confining her to bed for three months. During this attack, and after her recovery, she was troubled with severe constipation, frequent attacks of colic, and constant

nausea. Was compelled several times to resort to croton oil to secure an action from the bowels.

In 1865 she went to Canada to be under the charge of Dr. Mack, who treated her for some uterine trouble (was it vaginismus?), and also applied the actual cautery to the lower part of the spine, but all without any benefit, as the colic, cramps in the stomach, nausea, and general prostration remained the same as before.

In 1866 she first began to notice the dropping of her hands and the wasting of her forearms. About this time she made a violent exertion in attempting to hold a hard pulling pair of horses in their attempt to run away with her, and immediately after lost all power over both of her hands. The flexor muscles after a while recovered slightly, but the extensors of the fingers and hands have remained powerless until the present time.

Dr. S. Wier Mitchell, of Philadelphia, has treated her for the last two winters with electricity, but so far as extension of the hands or fingers is concerned without the slightest apparent benefit.

She states that the muscles of her arms and shoulders have very materially improved under Dr. Mitchell's treatment, and that her general health is somewhat better, but that her hands and fingers are the same as at first, and that Dr. M. had given her a very unfavorable prognosis.

Dr. Mitchell's knowledge, skill, and experience in the use of electricity being equal, if not superior, to any one in this country, I felt satisfied that she had had all the benefit that that agent alone could give her, and I asked her if he had ever suspected that lead had anything to do as an agent in causing the paralysis. She replied that he had not; but that she had recently informed him of my first case, which was so similar to her own as to attract her attention, and stated to him that she had used the same material, "*Laird's Bloom of Youth*," since she was sixteen years of age. He then gave her iodide of potassium, but as there was no improvement he was inclined to think that lead had nothing to do with it.

My impression is, judging from the result since, that he did not give the medicine in sufficient quantity.

I applied the electrodes from a seventy cell Kidder's battery, and also from a powerful battery of Drescher's, without producing the slightest contraction of any of the extensor muscles except a very feeble action in the extensor-minimi-digitii and a barely perceptible action in the extensors of the ring fingers. Sensation was not entirely abolished. The same battery with only thirty cells

when applied to the shoulders or lower extremities produced strong muscular contractions. I immediately put her on 90 grs. of iodide of potassium a day, and as soon as the specific eruption of this medicine began to appear upon the face and neck, the same battery began to produce manifest contractions.

Fig. 1.



Lead palsy from use of "Laird's Bloom of Youth," from a photograph.

Fig. 2.

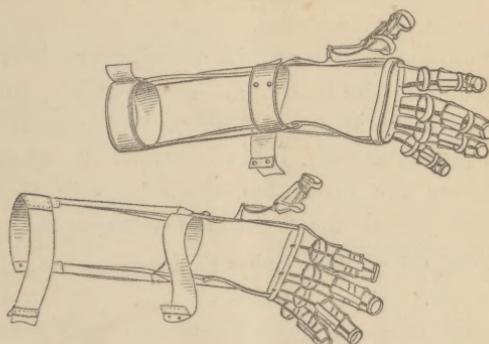


Casts of the same, taken for the purpose of fitting Dr. Hudson's extension apparatus, from a photograph.

The electricity (continuous current) was applied about fifteen minutes every day, and she wore Dr. Hudson's extension apparatus

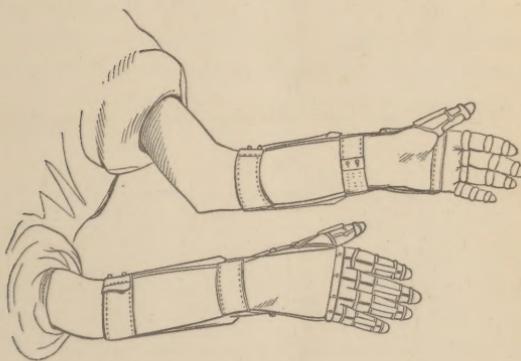
most of the time day and night. At the end of three weeks, without the extension apparatus, she was able to take a plate of ice cream in her left hand, and feed herself with a spoon in the right, a thing she had not done for two years.

Fig. 3.



Dr. Hudson's extension apparatus for hands and fingers.

Fig. 4.



Dr. Hudson's extension apparatus applied.

Of the value of Dr. Hudson's apparatus in cases of this kind I cannot speak in too high terms. It is very light and beautiful, is worn without any inconvenience, enables the patient to exercise the muscles of the hands and fingers constantly, and thus materially facilitates nutrition and development. The annexed cuts give a very good idea of its construction; but to have it neatly made I would advise the patient to employ Dr. Hudson in person, corner Fourth St. and Broadway, New York City.

The cuts are from photographs, by Mr. Mason, Photographer to

Bellevue Hospital, and give an accurate representation of the position of the hands without the instrument, of the action of the instrument, and also of the instrument itself.

Sufficient time has not yet elapsed for her entire recovery, but judging from the improvement made, and the result in the two other similar cases, I feel warranted in giving a favorable prognosis even in this almost hopeless case.

The use of cosmetics has within a few years become so very common, even among the better classes of society, and as most, if not all of them, are equally as dangerous to use as the particular one described in this Report, I have deemed it my duty to place these cases before the profession, that, knowing their injurious effects, they can guard their patients against thus voluntarily poisoning themselves through ignorance.